2.   (Three Times Amended)   A method of generating a television display at a receiver station, said receiver station comprising a television monitor for displaying television programming and a processor for generating and communicating a video image to said television monitor, said method comprising the steps of:

receiving a television signal, said television signal including digital data;

detecting said digital data and passing said detected digital data to said processor;

generating and communicating said video image in response to a first portion of said detected and passed digital data;

inputting a clear-and-continue signal to said processor in response to a second portion of said detected and passed digital data;

controlling said processor based on said clear-and-continue signal, said step of controlling comprising the steps of:

(a)   clearing at least a portion of an output memory;

(b)   jumping to a predetermined instruction; and

(c)   generating video image information based on said predetermined instruction.

3.   (Amended)   The method of claim 2, wherein said detected and passed digital data include a computer program, said method further comprising the steps of:

storing said computer program at a memory operatively connected to said processor; and

determining an address at said memory to which a jump is to be made.

4.   (Amended)   The method of claim 2, wherein a processor interrupt signal causes said processor to respond to said clear-and-continue signal, said method further comprising the step of:

inputting said clear and continue signal to interrupt said processor.

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5. (Unchanged) The method of claim 2, wherein said clear-and-continue signal is inputted to said processor by a controller, said method further comprising the steps of:

inputting data detected in said television signal to said controller; and

communicating signals from said controller to said processor based on said inputted data.

6. (Unchanged) A method of generating a television display at at least one of a plurality of receiver stations, each of said plurality of receiver stations having a television monitor for displaying television programming and a processor for generating and communicating a video image to said television monitor, comprising the steps of:

(a) receiving a clear-and-continue signal;

(b) receiving a control signal which operates at a transmitter station to communicate said clear-and-continue signal to a transmitter; and

(c) transmitting said clear-and-continue signal, said clear-and-continue signal effective at said at least one of a plurality of receiver stations to control said processor to clear at least a portion of an output memory, jump to a predetermined instruction, and generate video image information based on said predetermined instruction.

7. (Unchanged) A method of generating a television display at at least one of a plurality of receiver stations, each of said plurality of receiver stations having a television monitor for displaying television programming and a processor for generating and communicating a video image to said television monitor, comprising the steps of:

(a) receiving and storing a clear-and-continue signal; and

(b) causing said clear-and-continue signal to be communicated to a transmitter at a specific time, thereby to transmit said clear-and-continue signal, said clear-and-continue signal effective at said at least one of a plurality of receiver stations to control said processor to clear at least a portion

of an output memory, jump to a predetermined instruction, and generate video image information based on said predetermined instruction.

8.   (Twice Amended)   A method of generating a television display in a receiver station, said receiver station including at least one processor for generating a television video image and a television monitor for displaying transmitted television programming and said television video image, said method comprising the steps of:

receiving a broadcast or cablecast transmission including said transmitted television programming and an information transmission, said information transmission further including at least one embedded signal;

detecting said information transmission in said broadcast or cablecast transmission;

passing said detected information transmission to said processor ;

processing said detected information transmission, in response to said at least one embedded signal, to generate said television video image; and

causing said processor, in response to an instruct-to-clear signal, to clear said generated television video image.

9.   (Amended)   The method of claim 8, wherein the step of causing said processor to clear said generated television video image further includes the step of setting said generated television video image to a specific color.

10.   (Unchanged) The method of claim 8, further comprising the step of receiving said instruct-to-clear signal.

11.   (Amended)   The method of claim 10, wherein said instruct-clear-signal is said at least one embedded signal.

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12.   (Unchanged) The method of claim 8, further comprising the step of generating said instruct-to-clear signal in said receiver station.

13.   (Amended)   The method of claim 12, wherein the step of generating said instruct-to-clear signal further includes the step of using said processor to generate said instruct-to–clear signal based on said at least one embedded signal.

14.   (Amended)   The method of claim 8, wherein said received television programming includes only part of a television program, said method further comprising the steps of:

generating a balance of said television program; and

synchronizing delivery of said received part of said television program and said generated balance of said television program at at least one of said television monitor and a television storage device.

15.   (Amended)   The method of claim 14, wherein a memory is operatively connected to said at least one of said television monitor and said television storage device, and wherein said step of synchronizing further comprises placing said generated balance of said television program at said memory and clearing at least some of said memory.

16.   (Amended)   The method of claim 14, wherein a memory is operatively connected to said at least one of said television monitor and said television storage device, said generated balance of said television program includes a receiver specific datum, and wherein said step of synchronizing further comprises placing said receiver specific datum at said memory and clearing at least some of said memory.

17. (Amended) The method of claim 14, wherein said at least one processor performs at least one of said steps of generating said balance and synchronizing delivery, and wherein said method further comprises the step of detecting processor instructions in said information transmission which operate to generate said balance or synchronize said delivery.

18. (Amended) The method of claim 14, wherein said step of generating said balance of said television program comprises computing said balance of said television program.

19. (Amended) The method of claim 17, wherein a controller communicates said processor instructions to said at least one processor.

20. (Amended) The method of claim 14, wherein a controller controls said at least one processor to perform at least one of said steps of generating said balance and synchronizing delivery, said method further comprising the step of communicating said instruct-to-clear signal from said controller to said at least one processor.

21. (Amended) The method of claim 20, wherein said controller communicates said instruct-to-clear signal to interrupt said at least one processor.

24. (Amended) A method of generating a television display in at least one of a plurality of receiver stations, each of said plurality of receiver stations having a processor for generating a television video image and a television monitor for displaying transmitted television programming and said television video image, said method comprising the steps of:

(1) receiving, in a transmitter station, an instruct-to-clear signal;

(2) receiving, in said transmitter station, a control signal which operates at said transmitter station to communicate said instruct-to-clear signal to a transmitter; and

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(3)   transmitting said instruct-to-clear signal, said instruct-to-clear signal effective in at

least one of said plurality of receiver stations to cause said processor to clear said television video

image or to change said television video image to a specific color.

G9   25.   (Amended)   The method of claim 24, further comprising the steps of:

originating a first instruction specifying a control function to be executed;

originating a second instruction specifying a data characteristic selected from the group

consisting of structure, length, and format; and

organizing said first and second instructions in a sequence, said sequence comprising said

instruct-to-clear signal.

26.   (Unchanged) The method of claim 24, further comprising the step of transmitting

processor instructions which operate at said receiver station to generate information to be displayed

and subsequently to be cleared in response to said instruct-to-clear signal.

27.   (Amended)   The method of claim 24, further comprising the step of transmitting data

to be displayed based on said instruct-to-clear signal.

G10   28.   (Amended)   A method of generating a television display in at least one of a plurality of

receiver stations, each of said plurality of receiver stations having a processor for generating a

television video image and a television monitor for displaying transmitted television programming

and said television video image, said method comprising the steps of:

(1)   receiving, in a transmitter station, an instruct-to-clear signal;

(2)   storing, in said transmitter station, said received instruct-to-clear signal; and

(3)   causing said received and stored instruct-to-clear signal to be communicated to a

transmitter at a specific time, thereby to transmit said received and stored instruct-to-clear signal,

said received and stored instruct-to-clear signal effective in at least one of said plurality of receiver stations to cause said processor to clear said television video image or to change said television video image to a specific color.

29. **(Amended)** The method of claim 28, wherein said receiver station is capable of receiving a portion of a broadcast or cablecast transmission, said method further comprising the step of transmitting in said portion at least one of said instruct-to-clear signal and data to be stored in memory to be cleared in response to said instruct-to-clear signal.

30. (Amended) The method of claim 29, wherein a portion of said data is transmitted before said instruct-to clear signal is transmitted.

31. (Twice Amended) A method of generating a television display in a receiver station, said receiver station including at least one processor for generating a viewer-specific television programming video image and a monitor for displaying said viewer-specific television programming video image, said method comprising the steps of:

receiving, from remote sources, (i) a broadcast or cablecast transmission including transmitted television programming and (ii) a viewer-specific information transmission;

passing said detected viewer-specific information transmission and at least a portion of said transmitted television programming to said processor;

storing said passed viewer-specific information transmission;

causing said processor, in response to an instruct-to-clear signal, to clear a memory;

generating a viewer-specific television video image for storage at said memory; and

combining said viewer-specific television video image and said transmitted television programming to generate said viewer-specific television programming video image.

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32. (Amended) The method of claim 31, wherein said memory comprises video RAM.

33. (Amended) The method of claim 31, further comprising the step of detecting said instruct-to-clear signal in said broadcast or cablecast transmission.

34. (Amended) The method of claim 31, wherein said steps of detecting and clearing occur before said step of combining.

35. (Twice Amended) The method of claim 34, wherein said broadcast or cablecast transmission includes at least one embedded signal and said generating step occurs in response to said at least one embedded signal.

36. (New) The method of claim 24, wherein said instruct-to-clear signal causes said at least one of said plurality of receiver stations to process an interrupt signal.

II. REMARKS

Applicants have reviewed the Office action mailed September 6, 2002 and fully address herein the rejections contained therein.

The Office action begins with Section I that recites a number of issues that are neither rejections of nor objections to the claims of the instant application. Applicants address Section I of the Office action below, but note that the issues raised are not relevant to the patentablity of the claims in this application. For this reason, Section I of the Office action is improper and should therefore be withdrawn in its entirety.

Section I of the Office action is followed by Sections II-V that assert the following rejections of the pending claims.

In Section II of the Office action, claims 2, 28, and 31 are rejected under 35 U.S.C. § 112, second paragraph, as being indefinite.

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In Section III of the Office action, claims 2-21 and 24-35 are rejected under 35 U.S.C. § 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventors, at the time the application was filed, had possession of the claimed invention.

In Section IV of the Office action, claims 2, 6, 7, 8, 24, 28, and 31 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Kuboki in view of Kirimoto.

Applicants reply herein to each ground of rejection presented Office action. Applicants hereby request reconsideration of the instant application.

A.   Response To Section I Of The Office Action.

The Office action begins by identifying a list of 30 "Examples" of issues that have been raised in some of applicants' copending applications. The Examiner alleges that in some cases applicants have "handled and addressed" these issues inconsistently in different applications. The Examiner states that the list of "Examples" will be maintained by the Patent Office "in an attempt to ensure consistency in the way that these issues are handled between applications in the future." 9/06/02 Office action, p. 2.

Applicants respectfully submit that the "Examples" are simply irrelevant to the prosecution of the instant application for a number of reasons. The Patent Office itself has acknowledged that the list of 30 Examples is not relevant to certain applications because applicants have not asserted priority in those applications to the filing date of applicants' 1981 application:

> It is examiners position that after a series of interview, it has been mutually agreed upon that the instant application is entitled the earlier priority date of 9/11/87 based on the 07/096,096 application and not the 11/3/81 date based on the 06/317,510 application. Therefore, the written description and the enablement under 112 1st paragraph should be limited to the 1987 specification only. Additionally, the remarks set forth in Paragraph III, items 1-30 [the "Examples"] of the instant office action are carried over from other office actions in similar cases and are presented herein because in the past there have been disagreements between the priority date that the applicants are entitled to. The examiner will withdraw paragraph III from subsequent actions in the

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instant case application if applicants confirm on record in the next
communication that the instant application is entitled to only the 1987
priority date and the citations for claim support will be only provided
for the 1987 specification.[1]

The Examiner's position that he will withdraw the irrelevant 30 Examples only if "applicants

confirm on record in the next communication that the instant application is entitled to only the 1987

priority date" is improper. Whether or not *a particular claim* is afforded the benefit of an earlier

filing date under § 120 simply depends on whether the requirements of § 120 are met *for that claim.*

A claim either is or is not entitled to an earlier filing date, and such a determination cannot be made

without conducting the appropriate claim-by-claim analysis required by the controlling authorities.

Of course, it is applicants' decision whether or not to invoke § 120 in order to overcome an

intervening reference. In the instant application, applicants have distinguished the teachings of the

intervening references applied by the Examiner on the merits and have *not* invoked § 120 to avoid

the intervening references. Moreover, applicants have demonstrated specification support below

only with respect to the 1987 specification. Accordingly, the 30 Examples should be withdrawn.

Applicants question the relevance of the 30 Examples, as well as applicants' need to respond

to these Examples, because none of the examples forms the basis for any objection to or rejection of

a pending claim. *See* 37 C.F.R. § 1.111 ("In order to be entitled to reconsideration or further

examination, the applicant . . . must reply to every ground of objection and rejection in the prior

Office action."). Further, none of the Examples even refers to any claims that are presently pending

in the instant application. Accordingly, the 30 Examples simply have no bearing on the prosecution

of the claims pending in the instant application, and are therefore improper.

Applicants further question the basis for including the 30 Examples in the instant application

and applicants' need to respond to the Examples, because the vast majority of the Examples have

appeared at least once before in other applications and because applicants have already responded to

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[1] This paragraph was included in Office actions in the following applications: 08/487,397 mailed
9/06/02; 08/438,011 mailed 9/06/02; 08/447,496 mailed 9/06/02; and 08/479,215 mailed 9/05/02.

the vast majority of the Examples on the record in their copending applications. For example, all 30

Examples appear in identical form in the 07/17/02 Office action received in application Ser. No.

08/470,571 ("the '571 Application"). Additionally, at least 20 of the current Examples previously

appeared in the 08/28/01 Office action in the '571 Application. Accordingly, applicants, in their

01/28/02 and 01/09/03 Responses filed in the '571 Application, have already fully responded on the

record to all of the 30 Examples listed in the instant application.

In addition to the identical "Examples" being repeated from other recent Office actions,

applicants note that many of the issues discussed in the 30 Examples have been raised by the

Examiner before in slightly different forms in applicants' various copending applications. In

addressing such issues, applicants have at all times strived to respond in a consistent manner in all of

applicants' copending applications. Accordingly, applicants believe that the Examiner is mistaken in

his assertion that applicants have "handled and addressed" the issues raised in the 30 Examples

"inconsistently."

The 30 Examples are not relevant to the instant application, and applicants respectfully

request that the Examples be withdrawn and that the Examiner acknowledge the lack of relevance of

the 30 Examples to the prosecution of the instant application. Notwithstanding applicants' position

regarding the lack of relevance of the 30 Examples to the prosecution of the instant case, applicants

provide the following responses[2] to the 30 Examples. Applicants reserve their right to further

address any of the 30 Examples if, for example, they are ever raised in the context of an actual

rejection or objection.

Examples 1-3

Examples 1-3 address various issues concerning applicants' ability to claim priority to their 1981

application and the proper test for demonstrating priority under 35 U.S.C. § 120. Because applicants

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[2]   More detailed responses to many of the Examples appear in, among other places, applicants'
01/28/02 Response, 05/06/02 Response to Interview Summary, and 01/09/03 Response filed in the
'571 Application.

have not asserted priority to their 1981 application for any of the pending claims in the instant

application, Examples 1-3 are wholly irrelevant to the instant application.

In Example 1, the Examiner discusses prosecution of applicants' copending application Ser.

No. 08/470,571. More specifically, the Examiner focuses on the need to first demonstrate written

description support in applicants' 1987 specification when claiming priority under § 120. Applicants

have not asserted priority under § 120 to the date of their 1981 application for any of the pending

claims in the instant application, and applicants have identified detailed written description support

in their 1987 specification for each and every pending claim in the instant application in Appendix B.

Further, applicants respectfully disagree with the Examiner's characterization of their position

regarding priority in their copending applications. Finally, in addition to being totally irrelevant to

the instant application, applicants submit that the assertions made by the Examiner in Example 1 are

improper in the absence of any priority claim made by applicants under 35 U.S.C. § 120 to their 1981

application for any claim in the instant application.

In Example 2, the Examiner takes issue with applicants' discussion and position regarding

the proper test for demonstrating priority under § 120. Again, the Examiner refers to applicants'

responses filed in the '571 Application. Although applicants continue to disagree with the

Examiner's description and application of the legal test for demonstrating priority under § 120 (for

the detailed reasons set forth by applicants, e.g., in their 01/09/03 Response in the '571 Application),

the issue of priority under § 120 is simply not an issue in the instant application.

In Example 3, the Examiner further discusses applicants' ability to demonstrate priority under

§ 120 and their ability to support claims pending in the '571 Application using applicants' 1987

specification. Applicants believe that the issues raised in Example 3 are irrelevant to the instant

application and submit that the Examiner has mischaracterized applicants' position regarding their

ability to demonstrate written description support in both the 1987 and 1981 specifications for the

claims pending in the '571 Application and other applications in which applicants are asserting

priority under § 120.

Applicants' positions with respect to the various issues related to applicants' ability to claim priority to the date of their 1981 specification and the proper legal test for demonstrating priority under § 120 has been discussed in detail in applicants' submissions in the '571 Application. Applicants will continue to provide the factual and legal bases that justify their claim of priority to their 1981 application in those copending applications where such claim is appropriate and necessary (i.e., if intervening art is applied and applicants elect to invoke § 120 to overcome such intervening art).

Example 4

In Example 4, the Examiner discusses a claim limitation (i.e., "locally generating" images) relevant to certain claims pending in applicants' '571 Application. Applicants respectfully disagree with the Examiner's assertion in Example 4 that Teletext decoders locally generate images for output or display in the same manner that is being claimed in certain ones of applicants' copending applications, and applicants have already addressed the issue of whether the prior art applied by the Examiner teaches local generation of images in the '571 Application. If the Examiner bases a rejection of or objection to any claim pending in the instant application on the issues found in Example 4, or asserts that the issues found in Example 4 are in any way relevant to the instant application, applicants will address any such assertions at the appropriate time.

Examples 5 and 27

In Examples 5 and 27, the Examiner discusses the "Teletext prior art" and the inventions disclosed in applicants' 1987 specification in the context of an Office action and a Response filed in the '571 Application. The Examiner asserts in Examples 5 and 27 that applicants' 1987 "packetized SPAM" structure represents little more than applicants' own version of a "conventional extended Teletext system." In Example 27, the Examiner further asserts that certain structures recited in some of applicants' claims pending in the '571 Application (namely, a receiver, a signal detector, a processor, and an output device) are also "found within a conventional CPU/MP/computer implemented Teletext" receiver. These examples are not discussed or applied in the context of any of the claims

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pending in the instant application and the Examiner does not reject any of the pending claims based on the arguments made in Examples 5 and 27. If and when the Examiner makes rejections of specific pending claims on the basis of issues raised in Examples 5 and 27, applicants will further respond to such a rejection. Notwithstanding the lack of relevance of Examples 5 and 27 to this application, applicants strenuously disagree with the Examiner's disparaging assertions and characterization of the subject matter disclosed in applicants' 1987 specification. Finally, applicants note that they have previously addressed how applicants' claims differ from many "Teletext" prior art references in prior responses filed in copending applications.

Example 6

In Example 6, the Examiner discusses applicants' ability to obtain priority to their 1981 filing date for claiming "computer software." The Examiner discusses this issue with respect to arguments advanced in applicants' '571 Application related to applicants' prior use of the term "programming" in claims pending in the '571 Application. Applicants have fully addressed the issues raised in Example 6 in the '571 Application. The issues raised in Example 6, however, are not relevant to the instant application because applicants have not asserted priority under § 120 to the date of their 1981 application for any of the pending claims in the instant application. In fact, in Example 6, the Examiner acknowledges that applicants' 1987 specification does disclose the downloading of computer software. Notwithstanding the lack of relevance of Example 6 to this application, applicants disagree with the Examiner's position regarding applicants' ability to obtain priority to their 1981 filing date for claims that include the term "programming."

Example 7

In Example 7, the Examiner alleges that Teletext decoders found in the prior art are "signal processors" as the term "signal processor" is used within the context of applicants' claims pending in the '571 Application. Again, the issues raised in Example 7 are not discussed in the context of any claim currently pending in the instant application. Applicants do not understand the relevance of Example 7 to any of the claims currently pending in the instant application and no attempt is made to

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apply the discussion in Example 7 to the instant claims. Notwithstanding the lack of relevance of Example 7 to this application, applicants respectfully disagree with the Examiner's assertions and characterization of Teletext decoders found in the prior art and the signal processor disclosed by applicants. Applicants submit that the signal processors disclosed in applicants' specifications perform functions that are not disclosed in the cited Teletext prior art references. Finally, applicants will address these issues if and when an actual rejection is made by the Examiner based on the issues raised in Example 7.

Example 8

In Example 8, the Examiner asserts that it is applicants' position that applicants' claimed/disclosed technology is not "correlated/analogous" to Teletext technology. The Examiner, however, fails to provide any details regarding his position that "conventional Teletext systems" generally are correlated or similar to applicants' claimed technology. Indeed, such generalized "correlations" or "analogies" are wholly irrelevant to the issue of whether or not applicants' claims are patentable. Applicants' position is that none of the specific references, related to Teletext or otherwise, alone or in combination, teach the methods and apparatus claimed by applicants. The Examiner further argues that applicants have previously indicated it is their belief that the scope of many of their pending claims encompasses the "Weather Star" system/receiver technology. First, the question of whether or not a particular system would be covered by a pending claim is wholly irrelevant to the examination of the instant claims, unless such system is prior art. The Examiner has not established that the Weather Star system is prior art. Second, although the Examiner vaguely refers to applicants' "pending amended claims," he makes no reference to a specific application *or a specific claim*. Due to the Examiner's broad treatment of these issues, applicants cannot respond in any meaningful manner to the issues raised in Example 8.

Example 9

In Example 9, the Examiner discusses an issue that arose in the prosecution of the '571 Application regarding whether "digital television signals/programming" was well known in the relevant art at the

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time that applicants filed their specifications. In their 1/28/02 Response filed in the '571

Application, applicants fully addressed the Examiner's rejections under § 112, second paragraph, of

claims with limitations of "digital television." Further, applicants maintain their position stated in

the '571 Application regarding the Schwartz et al. reference. Applicants note that there are no

rejections of or objections to any of applicants' pending claims in the instant application based on the

issues raised in Example 9, and applicants reserve the right to further respond to the issues raised in

Example 9 if any of these assertions are relied on to object to or reject any claim in the future.

Example 10

In Example 10, the Examiner discusses two references of Zaboklicki: DE 2,914,981 and

GB#2,016,874. Despite the Examiner's characterization of applicants' arguments regarding these

references, applicants maintain that neither Zaboklicki reference anticipates or renders obvious any

of applicants' pending claims in the instant application. Applicants have previously addressed issues

raised in Example 10 in the '571 Application, and applicants will continue to address in detail any

rejection under § 102 or § 103 in which a Zaboklicki reference is applied.

Examples 11, 12, 15 and 16

In Examples 11, 12, 15 and 16, the Examiner discusses applicants' use of the term "programming" in

the 1981 and 1987 specifications. More specifically, Examples 11, 12, 15 and 16 assert that

applicants cannot claim a 1981 priority date for claims including the term "computer programming,"

because of an allegedly narrow definition of that term in the 1981 specification. The issues raised in

Examples 11, 12, 15 and 16 are only relevant if applicants rely on § 120 to obtain the benefit of their

1981 filing date. As applicants have not claimed priority to their 1981 application for any claims

currently pending in this application, the issue is not relevant to the instant application. If and when

the Examiner asserts that the issues found in Examples 11, 12, 15 and 16 are relevant to the claims

pending in the instant application, applicants will respond at the appropriate time. Finally, applicants

have fully addressed the "programming" issues raised in these examples in several prior responses

filed in the '571 Application.

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Example 13

In Example 13, the Examiner discusses whether or not radio and television arts represent non-analogous arts. The Examiner states that applicants have previously asserted that the radio and television arts are non-analogous arts. The Examiner's assertions in Example 13 do not form the basis for any rejection of or objection to any specific claim pending in the instant application. To the extent necessary, applicants will further address the issues raised by the Examiner in Example 13 if and when such issues are ever raised in the context of a rejection of or objection to a specific pending claim based on specific applied references in the identified arts.

Example 14

In Example 14, the Examiner discusses issues related to a claim recitation (simultaneous and sequential) in the context of two of applicants' copending applications (i.e., the '571 Application and Application Ser. No. 08/469,078. The Examiner's assertions in Example 14 do not form the basis for any rejection of or objection to any specific claim pending in the instant application. To the extent necessary, applicants will further address the issues raised by the Examiner in Example 14 if and when such issues are ever raised in the context of a rejection of or objection to a specific pending claim. Additionally, applicants note that they have fully addressed issues related to the Examiner's concerns regarding "simultaneous and sequential" in their January 28, 2002 Response filed in the '571 Application.

Examples 17-20 and 23-26

Examples 17-20 and 23-26 discuss various issues related to applicants' ability to obtain a priority date based on their 1981 application and the proper legal test to be applied when analyzing an applicants' ability to obtain a priority date under § 120. None of the issues discussed in Examples 17-20 and 23-26 is relevant to the instant application because applicants have not asserted a 1981 priority date for the claims pending in the instant application. Further, applicants have addressed the issues related to priority in detail in their responses filed in the '571 Application and Application Ser. No. 08/487,526.

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Example 21

In Example 21, the Examiner describes and compares the technology disclosed by applicants in their 1981 and 1987 specifications and asserts that the technology disclosed in applicants' two specifications is "vastly different." While it is true that the 1987 application includes many enhancements and improvements, applicants maintain that the subject matter disclosed in their 1981 application is also disclosed in the 1987 application. Second, because applicants have not asserted a 1981 priority date for the claims pending in the instant application, applicants' 1981 specification and any comparison between applicants' 1981 and 1987 specifications are not relevant to the instant application. Finally, the issues raised in Example 21 have previously been addressed in the '571 Application. Applicants will continue to provide appropriate factual and legal arguments as to why they are entitled to a 1981 priority date in all cases where it is relevant.

Example 22

In Example 22, the Examiner discusses a perceived difficulty in interpreting terminology in applicants' claims in light of the 1981 and 1987 specifications. More specifically, the Examiner asserts that certain terminology in applicants' claims takes on different interpretations when such terminology is read on different teachings from applicants' 1981 and 1987 disclosures. The alleged "problem" described in Example 22 is simply not applicable to the instant application because applicants have not asserted a priority date based on their 1981 application for any claim pending in the instant application. In the instant application, only the 1987 specification is used to support the pending claims. Accordingly, the issues raised by the Examiner in Example 22 are not relevant to the instant application. Further, applicants have fully addressed Example 22 in the '571 Application.

Example 28

In Example 28, the Examiner discusses a specific claim pending in the '571 Application (claim 56). Specifically, the Examiner questions applicants' written description support for the recitation "interactive ultimate receiver station" previously appearing in claim 56 of the '571 Application. Applicants maintain that both the 1981 and 1987 specifications unquestionably disclose "interactive

receiver stations." *See, e.g.,* 1981 Specification col. 20, ll. 23-27, and "Local Input" in Figure 6D; 1987 Specification, p. 288, ll. 1-20. The Examiner's assertions in Example 28 do not form the basis for any rejection of or objection to any specific claim pending in the instant application. To the extent necessary, applicants will further address the issues raised by the Examiner in Example 28 if and when such issues are ever raised in the context of a rejection of or objection to a specific pending claim. Finally, applicants note that they have already fully addressed Example 28 in the '571 Application.

Example 29

Example 29 discusses limitations directed to combining images (e.g., where a "portion" of an image is "replaced" by a portion of another image) which are allegedly present in claims in applicants' '571 Application. Applicants maintain that applicants' specifications broadly teach the combining of images. The Examiner's assertions in Example 29 do not form the basis for any rejection of or objection to any specific claim pending in the instant application. To the extent necessary, applicants will further address the issues raised by the Examiner in Example 29 if and when such issues are ever raised in the context of a rejection of or objection to a specific pending claim. Further, applicants have already fully addressed the issues raised in Example 29 in the '571 Application.

Example 30

In Example 30, the Examiner discusses the publication date of article/reference by Gunn et al. Applicants acknowledge that the Gunn reference is a transcript from a conference in London that took place from March 26-28, 1980. But this information alone does not qualify the reference as prior art (i.e., it was unclear when the paper was published). However, since the mailing of the 7/17/02 Office action in the '571 Application, applicants received a copy of the Gunn reference that bears a Massachusetts Institute of Technology Library received stamp dated December 4, 1980. The Examiner also alleges in Example 30 that applicants have previously neglected to provide the Office with information regarding the publication dates of many references. Applicants have diligently supplied the Office with references as they have become known to applicants. In some instances,

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applicants were not provided with dates of certain references, so applicants were not able to provide the Office with dates for each and every reference identified on some of applicants' Information Disclosure Statements. Additionally, applicants submit that the discussion in Example 30 is not relevant to the instant application because the Gunn reference is not applied against any claim pending in the instant application.

B.   Response To Rejections Under Section 112, Second Paragraph.

Claims 2, 28, and 31 stand rejected under 35 U.S.C. § 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicants regard as the invention. Applicants address each ground of rejection under the second paragraph of Section 112 as follows.

Claims 2 stands rejected because Examiner states that the term "said digital data" appears to have multiple antecedent bases. Applicants have amended claim 2 to recite "detected" and "detected and passed" digital data. Applicants submit that claim 2 as amended meets the requirements of the second paragraph of Section 112.

Claims 28 stands rejected because Examiner states that the term "said instruct-to-clear signal" appears to have multiple antecedent bases. Applicants have amended claim 28 to recite a "received" and a "received and stored" instruct-to-clear signal. Applicants submit that claim 28 as amended meets the requirements of the second paragraph of Section 112.

Claims 31 stands rejected because Examiner states that the term "said viewer specific information transmission" appears to have multiple antecedent bases. Applicants have amended claim 2 to recite a "received," a "detected" and a "passed" viewer specific information transmission. Applicants submit that claim 31 as amended meets the requirements of the second paragraph of Section 112.

C.   Response To Rejection Under Section 112, First Paragraph.

The Examiner prefaces his rejections under § 112, first paragraph, by listing a series of quotations from a decision issued in prior litigation pending before the International Trade Commission (ITC) involving one of applicants' issued patents. In Section III, the Examiner simply lists several quotations and then states that the Examiner "continues to adopt these same positions in regard to the pending amended claims currently at issue." Apparently, the Examiner includes these quotations to support his rejections under § 112, first paragraph. The Examiner, however, fails to provide any discussion or explanation regarding the proper procedural and factual context of these quotes. Placed in an accurate and proper context, the record from the ITC litigation actually supports applicants' position that the pending claims are justified by the instant specification.

Before addressing the specific passages quoted in the Office action, applicants must first provide a procedural overview of the ITC litigation. In the litigation before the ITC, the owner of applicants' issued patents and the assignee of the instant application, Personalized Media Communications L.L.C. (PMC), alleged that certain products imported into the United States infringed several claims of U.S. Patent No. 5,225,277. Following an evidentiary hearing, the ITC administrative law judge, Judge Luckern, issued a decision entitled "Initial and Recommended Determinations" (Initial Determinations) on October 20, 1997. *See In re Certain Digital Satellite Sys. (DSS) Receivers & Components Thereof*, No. 337-TA-392, 1997 WL 696255 (Int'l Trade Comm'n Oct. 20, 1997). In connection with the evidentiary hearing, three separate groups submitted briefs and arguments to Judge Luckern: 1) PMC; 2) the accused infringers (Respondents); and 3) the ITC Staff. Judge Luckern's Initial Determinations made various findings and concluded that: 1) claims 3, 6, 7, 12, 15, 35, and 44 were invalid as indefinite; 2) claims 3, 6, 7, 12, 15, 35, and 44 were invalid as not enabled; 3) claim 7 was invalid as anticipated; and 4) no asserted claim was infringed. Significantly, the Respondents challenged only one claim, claim 44, for lack of written description support. Judge Luckern found that claim 44 was *not invalid* under § 112, first paragraph, for a failure to provide proper written description support. *Thus, no claim asserted in the ITC litigation*

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was held invalid by Judge Luckern under 35 U.S.C. § 112, first paragraph, for failure to provide

adequate written description support.

On December 4, 1997, the ITC issued its Final Determination, which adopted some, but not all, of Judge Luckern's Initial Determinations. Specifically, the ITC's Final Determination adopted Judge Luckern's claim constructions and findings that the asserted claims were indefinite and not infringed. On the other hand, the ITC did not adopt Judge Luckern's other findings concerning, for example, whether the claims were enabled or whether claim 7 was anticipated. On appeal before the Federal Circuit were only those findings by Judge Luckern that the ITC expressly adopted in its Final Determination. The Federal Circuit's opinion: 1) reversed Judge Luckern's and the ITC's determination that the asserted patents claims were invalid for indefiniteness; 2) vacated Judge Luckern's and the ITC's determination that asserted claim 7 was not infringed; and 3) affirmed Judge Luckern's and the ITC's determination that claims 6 and 44 were not infringed. *See Personalized Media Communications, LLC v. Int'l Trade Comm'n*, 161 F.3d 696, 48 USPQ2d 1880 (Fed. Cir. 1998). As a result of the Federal Circuit opinion, the case was remanded to the ITC. After the case was remanded to the ITC, PMC withdrew its complaint and the ITC vacated Judge Luckern's Initial Determination with respect to the findings of invalidity for anticipation and lack of enablement. *See In re Certain Digital Satellite Sys. (DSS) Receivers & Components Thereof*, No. 337-TA-392, 2001 WL 535427 (Int'l Trade Comm'n May 13, 1999). Accordingly, the quotes relied upon by the Examiner in the Office action, all of which are from Judge Luckern's discussion of invalidity for lack of enablement, were vacated by the ITC.

As applicants have already noted, with respect to the only claim even challenged under the written description requirement of § 112, Judge Luckern concluded that the claim was *not invalid* on that basis.[3] Regarding the first quote, Judge Luckern's belief that the 1987 specification is "difficult to understand as it is dealing with many possible systems," even if true, is not a proper reason for the

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[3]   Additionally, in allowing the claims asserted in the ITC to issue, the PTO understood that those claims were adequately supported under § 112.

Examiner to conclude that none of applicants' claims are supported under § 112. Regarding the second quote, in which Judge Luckern discusses the complainant's identification of written description support for the asserted claims of U.S. Patent No. 5,225,277, what is important is that Judge Luckern did not find that any of the asserted claims were invalid for failure to satisfy the written description requirement of § 112. Finally, the last two quotes identified by the Examiner actually contain statements made by the ITC Staff in opening arguments. The comments advanced by the Staff in the ITC litigation describing "directions to a treasure map" and "ships passing in the night" are attorney arguments advanced during litigation, and such arguments are simply not indicative of applicants' actions before the PTO.

When the Examiner's citations to the ITC record are presented accurately and in their proper substantive and procedural context, the citations do not support the Examiner's position. Indeed, the ITC record is consistent with applicants' position on the written description issue. The statements relied upon by the Examiner are nothing more than dicta concerning a finding by Judge Luckern that was later vacated. Further, even if these findings had not been vacated, the observations by Judge Luckern do not contradict applicants' position that the pending claims are properly supported under § 112, first paragraph.

In Section III, the Examiner rejects all claims under 35 U.S.C. § 112, first paragraph, as containing subject matter that was not sufficiently described in the specification. In making these rejections, however, the Examiner does nothing more than identify specific limitations pending in a given claim and state "it is not clear where the disclosure as originally filed described the recited step/process . . . " There is absolutely no analysis of, reference to, or discussion of any of the teachings found in applicants' specification which relate to the claimed subject matter.

Because the Examiner has failed to provide any reason or analysis as to *why* applicants' claims are not sufficiently supported under 35 U.S.C. § 112, first paragraph, the Examiner has failed to meet his burden to sustain such a rejection.

An Examiner has the initial burden of presenting a prima facie case of unpatentability by:

"[P]resenting evidence or reasons why persons skilled in the art would not recognize in the disclosure a description of the invention defined by the claims." . . . [T]he burden placed on the examiner varies, depending on what the applicant claims. If the applicant claims embodiments of the invention that are completely outside the scope of the specification, then the examiner or Board need only establish this fact to make out a prima facie case. If, on the other hand, the specification contains a description of the claimed invention, albeit not *in ipsis verbis* (in the identical words), then the examiner or Board, in order to meet the burden of proof, must provide reasons why one of ordinary skill in the art would not consider the description sufficient. Once the examiner or Board carries the burden of making out a prima facie case of unpatentability, "the burden of coming forward with evidence shifts to the applicant." . . . [to] show that the invention is adequately described to one skilled in the art.

In re Alton, 76 F.3d 1168, 1175 (Fed. Cir. 1996) (citations omitted).

As the Alton case makes clear the Examiner's burden varies in making a valid rejection under § 112, first paragraph. In the Office action, the Examiner has not even met the most lenient burden described in Alton. The Examiner does not assert that applicants' claims or specific limitations in applicants' claims are completely outside the scope of the specification; the Examiner simply identifies specific claim limitations and requests "clarification."

Accordingly, under the standard set forth in *Alton*, the Examiner has not met his burden to "provide reasons why one of ordinary skill in the art would not consider the description sufficient." *Alton*, 76 F.3d at 1175.

Notwithstanding the Examiner's failure to meet his burden for making a proper rejection of applicants' pending claims under § 112, first paragraph, applicants have provided a chart (attached as Appendix B) that identifies detailed written description support for each and every limitation of the pending claims. Applicants respectfully submit that the illustrative support identified in Appendix B, together with applicants' narrative discussion below, demonstrates that the claimed subject matter is described in the specification in such a way as to reasonably convey to one skilled in the art that applicants had possession of the claimed inventions at the time the 1987 application was filed. Applicants wish to note that the support provided below and in Appendix B is illustrative and the claims may be supportable by other/additional teachings of the 1987 specification. Applicants also

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wish to note that the claims of the instant application should not be construed to be limited based on the support provided.

In Section III: A1- A7, the Examiner requests clarification for specific portions of the claims. Such clarification is provided below.

1) Claim 2 And Claims Depending Therefrom

Claim 2 sets forth a method generating a television display at a receiver station. The receiver station includes a television monitor for displaying television programming and a processor. The processor is for generating a video image and communicating that image to a television monitor. The method comprises receiving a television signal that includes digital data. The digital data is detected and passed to the processor. In response to a first portion of the digital data, the video image is generated and communicated. In response to a second portion of the digital data, a clear-and-continue signal is input into the processor. Based on the clear-and-continue signal, the processor is controlled in the following ways: the processor clears a portion of output memory; the processor jumps to a predetermined instruction; and the processor generates a video image based on the predetermined instruction.

An example of such a method is provided in Example 10 of the specification. This example discloses that "[a] microcomputer [at a receiver station] generates image information of a first video overlay and generates selected information of subsequent overlays." Spec. p. 485, ll. 14-18. A transmission of a particular television program is received at a receiver station. Spec. p. 470, ll. 9-12. The television program includes SPAM messages (Spec. p. 481, lines 6 - 9) which include digital data bits. Spec. p.14, l. 35 - p. 15, l. 2. One such SPAM message, "[a] program-instruction-set message (#10) [is] transmitted [to the receiver station and the] message [is] detected at decoder, 203, and causes decoder, 203, to load and execute at microcomputer, 205, the information segment of said message . . ." Spec. p. 484, ll. 12-18. This disclosure provides support for the recited "first portion of the digital data." Then, "[u]nder control of the instructions of [the program-instruction-set message]" (Spec. p. 485, ll. 14 - 15), "the microcomputer, 205, of Figs. 7 and 7F generates image

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information of a first video overlay." Spec. p. 485, ll. 15 - 18. Then, the microcomputer "causes binary image information of '$1,071.32' to be placed at bit locations of video RAM that produce video image information in the upper left hand of a video screen when video RAM information is transmitted to said screen." Spec. p. 486, ll. 20 - 27.

At the receiver station, "[a] decoder, 203, detects the information of said message [including a] 1st cease-outputting message (#10)." Spec. p. 499, ll. 30 - 32. The 1st cease-outputting message, which is included in the aforementioned SPAM messages transmitted with the television program (Spec. p. 499, l. 23-24), is received at the receiver station. *Id.* This disclosure provides support for the recited "second portion of the digital data." The receipt of that message "causes decoder, 203, ... to input the aforementioned clear-and-continue instruction to the CPU of microcomputer, 205." Spec. p. 500, ll. 10-15.

"Receiving said clear-and-continue instruction ... causes microcomputer, 205, in a fashion well known in the art, to cease its current function, ... [and] to execute a particular when-interrupted portion of [the program-instruction-set message]." Spec. p. 500, ll. 15-22. Based on the when-interrupted portion of the program-instruction-set message, the microcomputer at the receiver station: clears video RAM memory (Spec. p. 501, ll. 16-17); jumps "to a particular first-clear-and-continue address of the instructions (Spec. p. 501, ll. 5-16);" and, based on the "first-clear-and-continue instructions" found at the aforementioned address, generates a video image (Spec. p. 485, 14-18) of, for example, a number (Spec. p. 501, ll. 16-23) and "causes binary image information of said number to be placed at bit locations that produce video image information in the lower middle portion of a video screen." Spec. p. 501, ll. 23-25.

Applicants respectfully submit that the specification filed in 1987 demonstrates that applicants possessed the invention defined by claim 2, as shown by the specific citations in Appendix B and the general discussion above.

Claims 3-5 depend from claim 2. The support for these claims is based on the support discussed above with respect to claim 2. These claims set forth further features found in Example 10

of the specification. The specific support for the elements set forth in these claims is fully

demonstrated in the charts contained in Appendix B.

2) Claim 6

Claim 6 sets forth a method generating a television display at at least one of a plurality of

receiver stations. Each of the plurality of receiver stations includes a television monitor for

displaying television programming and a processor. The processor is for generating a video image

and communicating that image to a television monitor. The method comprises receiving a clear-and-

continue signal at a transmission station. A control signal is received which causes the transmitter

station to communicate the clear-and-continue signal to a transmitter. The clear-and-continue signal

is transmitted. The clear-and-continue signal that is transmitted is effective at at least one of the

plurality of receiver stations to control a processor to clear at least a portion of an output memory,

jump to a predetermined instruction, and generate video image information based on said

predetermined instruction.

The support discussed above in connection with claim 2 is also applicable to claim 6. In

addition, claim 6 recites that "each of said plurality of receiver stations [has] a television monitor for

displaying television programming and a processor for generating and communicating a video image

to said television monitor." The specification discloses at least a second subscriber station with a

second monitor (Spec. p. 470, ll. 27-31), and that a second processor at the second subscriber station

generates a video image and communicates the image to a monitor. *Id.*

Claim 6 also recites "receiving a clear-and-continue signal." The specification discloses the

presence of a "1st cease-outputting message" at an intermediate transmission station (ITS) (Spec. p.

372, ll. 20-35)--that message is prerecorded in programming previously sent to the ITS (Spec. p. 344,

ll. 24-31) in a transmission that is received (Spec. p. 343, ll. 26-31) and recorded at the ITS. Spec. p.

347, ll. 4-5.

Claim 6 also recites "receiving a control signal which operates at a transmitter station to

communicate said clear-and-continue signal to a transmitter." The specification discloses that a first

cueing message is received (Spec. p. 366, 1. 14 - p. 367, 1. 2) at the ITS that causes the ITS to transfer

prerecorded programming (e.g., program unit Q) to a field distribution system (Spec. p. 367, 1. 2 – 9).

The prerecorded programming contains embedded messages including the aforementioned "1st

cease-outputting message." Spec. p. 372, 11. 20-28.

Claim 6 also recites that the clear-and-continue signal is transmitted. The specification

discloses that the "1st cease-outputting message" is transmitted. (Spec. p. 372, 11. 20-35). The

recited clearing, jumping, and generating step are supported as discussed above in connection with

claim 2.

Applicants respectfully submit that the specification filed in 1987 demonstrates that

applicants possessed the invention defined by claim 6, as shown by the specific citations in

Appendix B and the general discussion above.

3) Claim 7

Claim 7 sets forth a method of generating a television display at at least one of a plurality of

receiver stations. Each of the plurality of receiver stations includes a television monitor for

displaying television programming and a processor. Each also includes a processor for generating a

video image and communicating that image to a television monitor. The method comprises

receiving and storing a clear-and-continue signal. The clear-and-continue signal is caused to be

communicated to a transmitter at a specific time thereby to transmit the clear-and-continue signal.

The clear-and-continue signal is effective at the at least one of a plurality of receiver stations to

control a processor to clear at least a portion of an output memory, jump to a predetermined

instruction, and generate video image information based on the predetermined instruction.

The support discussed above in connection with claim 2 is also applicable to claim 7. In

addition, claim 7 recites "storing a clear-and-continue signal." The specification discloses that

programming including a "1st cease-outputting message" is stored at a recorder. Spec. p. 372, 11. 20-

35. The signal is embedded in the programming (e.g., program unit Q) that was previously received

at the ITS (Spec. p. 343, ll. 26-32; p. 344, ll. 24-31) and recorded at the recorder (Spec. p. 347, l. 4-5).

Claim 7 recites "causing said clear-and-continue signal to be communicated to a transmitter at a specific time." The specification discloses that a transmission including embedded messages is transmitted in response to a cueing message transmitted from a program originating studio at a specific time. Spec. p. 366, ll. 19 - 20. The recited clearing, jumping, and generating functions are addressed fully in Appendix B and are supported as discussed above in connection with claim 2.

Applicants respectfully submit that the specification filed in 1987 demonstrates that applicants possessed the subject matter defined by claim 7, as shown by the specific citations in Appendix B and the general discussion above.

4) Claim 8 And Claims Depending Therefrom

Claim 8 sets forth a method of generating a television display at a receiver station. The receiver station includes a television monitor for displaying television programming and a television video image, and a processor. The processor is for generating a television video image. The method comprises receiving a broadcast or cablecast transmission including television programming and an information transmission that includes at least one embedded signal. The information transmission is detected and passed to the processor. In response to at least one embedded signal, the detected information transmission is processed to generate and communicate the television video image. In response to an instruct-to-clear signal, the processor is caused to clear the generated video image.

The support discussed above in connection with claim 2 is also applicable to claim 8. In addition, claim 8 recites a broadcast or cablecast transmission including television programming and an information transmission with embedded signals. The specification discloses that a broadcast or cablecast transmission can be transmitted (Spec. p. 324, ll. 11-21) including programming such as a commercial called program unit Q (Spec. p. 478, ll. 23-26) with embedded SPAM message signals. Spec. p. 481, ll. 6-9.

Claim 8 also recites detecting, passing and processing an information transmission in the broadcast or cablecast transmission. The specification supports embedding SPAM messages in the transmission of the programming of Q. Spec. p. 481, ll. 6-9.

Claim 8 recites "processing said detected information transmission, in response to at least one embedded signal." The specification discloses that "[a]t the [subscriber station], receiving the program-instruction-set message (#10) ... causes decoder, 203, to ... execute at microcomputer, 205, the information segment of said message . . ." (Spec. p. 484, ll. 12-18) This message is the same message that is passed to the processor in the previous step.

Claim 8 recites "causing said processor, in response to an instruct-to-clear signal, to clear the generated television video image." Support for the clearing limitation is disclosed by ". . . 1st cease-outputting message (#10) [which] causes decoder, 203, . . . to input the aforementioned clear-and-continue instruction to the CPU of microcomputer, 205. . . ." Spec. p. 500, ll. 10-15. "Receiving said clear-and-continue instruction ... causes microcomputer, 205, in a fashion well known in the art, to cease its current function, ... to execute a particular when-interrupted portion of said program instruction set of Q.1." (Spec. p. 500, ll. 15-22) And then, "under control of the instructions of said when-interrupted portion, microcomputer, 205, . . . clears video RAM; . . . ." Spec. p. 501, ll. 5-17.

Applicants respectfully submit that the specification filed in 1987 demonstrates that applicants possessed the subject matter defined by claim 8, as shown by the specific citations in Appendix B and the general discussion above.

Claims 9-21 depend from claim 8. The support for these claims is based on the support discussed above with respect to claim 8. The specific support for the elements set forth in these claims is fully demonstrated in the charts contained in Appendix B.

5) Claim 24 And Claims Depending Therefrom

Claim 24 sets forth a method generating a television display at at least one of a plurality of receiver stations. Each of the plurality of receiver stations includes a television monitor for displaying television programming, and a processor. The processor is for generating a video image

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and communicating that image to the television monitor. The method comprises receiving an

instruct-to-clear signal and a control signal at a transmitter station. The control signal operates at the

transmitter station to communicate the instruct-to-clear signal to a transmitter. The instruct-to-clear

signal is transmitted. The instruct-to-clear signal is effective at at least one of the plurality of

receiver stations to clear a television video image or change the video image to a specific color.

The support discussed above in connection with claim 6 is also applicable to claim 24. In

addition, claim 24 recites "a television monitor for displaying transmitted television programming

and said television video image." This limitation is supported in the specification by the following

passage:

> Automatically, microcomputer, 205, combines its specific
> video RAM binary image information of "$1,071.32" with its
> received conventional video information. And automatically
> $1,071.32 is displayed at the upper left hand corner of the
> picture screen of monitor, 202M, which is the corner to which
> the image of the person shown at said screen is pointing.
> (Simultaneously and in the same fashion, apparatus at the
> station of said second subscriber causes the specific video
> RAM image information of said station, which is "$1,080.64",
> to be displayed at the upper left hand corner of the picture
> screen of the monitor, 202M, of said station and said subscriber
> can see the image said person pointing at $1,080.64.

p. 491, ll. 10-24; p. 490, ll. 21-23).

Claim 24 also recites "receiving an instruct-to-clear signal." The specification discloses that

a "1st cease-outputting message" is received at an intermediate transmission station (ITS) (Spec. p.

372, ll. 20-35)--that message is prerecorded in programming previously sent to the ITS (*Id.*) and

recorded at the ITS. Spec. p. 344, ll. 24-31; p. 347, ll. 4-5.

Claim 24 also recites "receiving, in [a] transmitter station, a control signal which operates at

[the] transmitter station to communicate [an] instruct-to-clear signal to a transmitter." The

specification discloses that a first cueing message is received (Spec. p. 366, l. 14 - p. 367, l. 2) at the

ITS that causes the ITS to transfer prerecorded programming (e.g., program unit Q) to a field

distribution system (Spec. p. 367, l. 2 – 9). The prerecorded programming contains embedded

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messages including the aforementioned "1st cease-outputting message." Spec. p. 372, ll. 20-28.

Claim 24 recites that the "instruct-to-clear signal [is] effective in at least one of said plurality of receiver stations to cause said processor to clear said television video image or to change said television video image to a specific color." The specification discloses clearing video RAM in response to a message that inputs an instruction (Spec. p. 500, ll. 9-15), "[r]eceiving said clear ... instruction as an interrupt signal causes microcomputer, 205, ... to execute a particular when-interrupted portion of said program instruction set of Q.1." Spec. p. 500, ll. 15-22. Then, "[a]utomatically, under control of said instructions, microcomputer, 205, clears video RAM; sets the background color of video RAM to ... black; ...." Spec. p. 501, ll. 16-18.

Applicants respectfully submit that the specification filed in 1987 demonstrates that applicants possessed the invention defined by claim 24, as shown by the specific citations in Appendix B and the general discussion above.

Claims 25-27 and 36 depend from claim 24. The support for these claims is based on the support discussed above with respect to claim 24. The specific support for the elements set forth in these claims is fully demonstrated in the charts contained in Appendix B.

6) Claim 28

Claim 28 sets forth a method generating a television display at at least one of a plurality of receiver stations. Each of the plurality of receiver stations includes a television monitor for displaying television programming and a processor and a television monitor for displaying transmitted television programming. The processor is for generating a television video image. The method comprises receiving an instruct-to-clear signal at an transmitter station. The received and stored instruct-to-clear signal is caused to be communicated to a transmitter at a specific time. Thereby the received and stored instruct-to-clear signal is transmitted. The instruct-to-clear signal is effective at at least one of the plurality of receiver stations to clear the television video image and change the video image to a specific color.

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The support discussed above in connection with claim 24 and 7 is also applicable to claim 28. In addition, claim 28 recites storing the instruct-to-clear signal. The storage of the instruct-to-clear signal is supported in the specification by a recorder, 76, that records the programming of program unit Q (Spec. p. 347, ll. 4-5) which includes the "1st cease-outputting message." Spec. p. 372, ll. 22-28. Causing the instruct-to-clear signal to be communicated to a transmitter at a specific time is supported in the specification. Spec. p. 366, l. 19 - p. 367, l. 9; p. 372, ll. 20-28.

Applicants respectfully submit that the specification filed in 1987 demonstrates that applicants possessed the invention defined by claim 28, as shown by the specific citations in Appendix B and the general discussion above.

Claims 29 and 30 depend from claim 28. The support for these claims is based on the support discussed above with respect to claim 28. The specific support for the elements set forth in these claims is fully demonstrated in the charts contained in Appendix B.

7) Claim 31 And Claims Depending Therefrom

Claim 31 sets forth a method of generating a television display in a receiver station. The receiver station includes at least one processor for generating a viewer-specific television programming video image and a monitor for displaying the viewer-specific television programming video image. The method comprises receiving, from remote sources, (i) a broadcast or cablecast transmission including transmitted television programming and (ii) a viewer-specific information transmission. The received viewer-specific information transmission and the transmitted television programming are detected. The detected viewer-specific information transmission and at least a portion of the transmitted television programming are passed to the processor. The passed viewer-specific information transmission is stored. The processor is caused, in response to an instruct-to-clear signal, to clear a memory. A viewer-specific television video image for storage at the memory is generated. The viewer-specific television video image and the transmitted television programming are combined to generate the viewer-specific television programming video image.

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An example of such a method is provided in "Controlling Computer-Based Combined Media Operations" section of the specification. Spec. p. 447-451. This example discloses, by reference (Spec. p. 451, ll. 1-3) to earlier disclosure, that "TV monitor, 202M, then displays the image shown in Fig. 1C which is the microcomputer generated graphic of the subscriber's own portfolio performance overlaid on the studio generated graphic." Spec. p. 26, ll. 8-11. This supports the recited "generating a television display in a receiver station" and the recited limitation that the receiver station also includes "a monitor for displaying said viewer-specific television programming video image." The specification supports the receiver station in, e.g., Fig. 1 which "shows a video/computer combined medium subscriber station." Spec. p. 19, ll. 6-7.

The claim recites that the "receiver station [includes] at least one processor for generating a viewer-specific television programming video image . . ." The specification discloses a "... microcomputer, 205, of the [subscriber station] (and microcomputers, 205, similarly at each of a large plurality of other subscriber stations) has been updated and contains all relevant stock information." Spec. p. 450, ll. 2-6. The microcomputer contains a disk drive that hold a file that "contains information on the portfolio of financial instruments owned by the subscriber that identifies the particular stocks in the portfolio [, etc.]" Spec. p. 21, ll. 5-14.

The specification discloses that "(i) a broadcast or cablecast transmission including transmitted television programming and (ii) a viewer-specific information transmission" are received from remote sources. As to the broadcast or cablecast transmission, the specification discloses that a program originating studio originates the transmission of a "Wall Street Week" program. Spec. p. 450, l. 10-12. The specification discloses that a subscriber station receives the "Wall Street Week" program originated from the remote originating studio. Spec. p. 450, ll. 22-25. As to the viewer specific information transmission, the specification discloses "Each time the stockbroker who represents the subscriber of the station of microcomputer, 205, executes a transaction (that is, buys or sells stocks) for said subscriber's account, a computer at said broker's office station telephones microcomputer, 205; . . . ." Spec. p. 448, ll., 30-34. Thus the viewer

specific portfolio information is received from the remote broker's office. The specification

discloses that a subscriber station ". . . inputs data of the [aforementioned] transaction (which data

includes, for example, the identity of the company whose shares were traded, the number of shares

bought or sold, and whether the transaction was a buy or a sale); . . . ." Spec. p. 448, l. 34- p. 449, l.

3.

Claim 31 recites "passing said detected viewer-specific information transmission and at least

a portion of said transmitted television programming to said processor." Spec. p. 448, l. 34- p. 449,

l. 3. The specification discloses that the data of the transaction mentioned above is input to the

processor. The specification also discloses that the "Wall Street Week" program is received at the

subscriber station and split into two paths, one inputted to a TV signal decoder and one to the

processor. Spec. p. 450, ll. 16-26.

Claim 31 recites "storing said passed viewer-specific information transmission." The

specification discloses that the broker's office computer "... causes microcomputer, 205, to updates

[sic] its stock portfolio records in a predetermined fashion . . . [and causes the] identity of the stocks

and number of shares in the subscriber's portfolio automatically to exist at [the subscriber station

computer.]" Spec. p. 449, ll. 3-9.

Claim 31 recites "causing said processor, in response to an instruct-to-clear signal, to clear a

memory." The specification discloses that when a new transmission is sent from an originating

studio, a series of control instructions are generated which cause, among other things, the receiver to

clear RAM. Spec. p. 451, ll. 1-3; p. 21, l. 35 - p. 23, l. 12.

Claim 31 recites "generating a viewer-specific television video image for storage at said

memory." The specification discloses that a graphic image of the subscriber's stock portfolio's

performance is constructed. Spec. p. 24, l. 22 - p. 25, l. 14 Then, the digital bit information of the

graphic image is entered into video RAM. *Id.*

Finally, claim 31 recites "combining said viewer-specific television video image and said transmitted television programming to generate said viewer-specific television programming video image." The specification discloses that the

> microcomputer, 205, at the PC-MicroKey 1300 [overlays] the graphic information in its graphics card onto the received composite video information and transmit the combined information to TV monitor, 202M. TV monitor, 202M, then displays the image shown in Fig. 1C which is the microcomputer generated graphic of the subscriber's own portfolio performance overlaid on the studio generated graphic

Spec. p. 26, ll. 4-11.

Applicants respectfully submit that the specification filed in 1987 demonstrates that applicants possessed the invention defined by claim 31, as shown by the specific citations in Appendix B and the general discussion above.

Claims 32 and 36 depend from claim 31. The support for these claims is based on the support discussed above with respect to claim 31. The specific support for the elements set forth in these claims is fully demonstrated in the charts contained in Appendix B.

Applicants submit that the specific citations in Appendix B and the general discussion above provide the clarification requested by the Examiner in Section III: A1- A7.

D.   Response to Prior Art Rejections

1)   The pending claims are patentable over Kuboki in veiw of Kirimoto

Claims 2, 6, 7, 8, 24, 28, and 31 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Japanese patent publication 62-12285 of Kuboki[4] (Kuboki) in view of Japanese patent publication 61-236284 of Kirimoto[5] (Kirimoto).

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[4] The Office action included the Japanese language published application and brief English abstract of the application. Attached, as Appendix C, is an English translation of Kuboki.

[5] The Office action included the Japanese language published application and brief English abstract of the application. Attached, as Appendix D, is an English translation of Kirimoto.

The Office action fails to establish that every limitation of claim 2 is taught or suggested by Kuboki in view of Kirimoto. For example, the Office action provides no citations to the references to establish that they show or suggest the recited steps of "jumping to a predetermined instruction; and generating a video image information based on said predetermined instruction," both of which are included in the recited "controlling" step that is based on the "clear-and-continue" signal. The Office action appears to suggest that these limitations are shown in Kuboki by "look[ing] for new page." There is nothing in the Office action that explains how "look[ing] for new page" teaches or suggests that the recited "controlling" step, which includes the recited "jumping" and "generating" steps, is based on the recited "clear-and-continue signal." The Office action also appears to suggest that the signal which Kirimoto uses to detect a channel change teaches a "clear-and-continue" signal. As noted above, there is no suggestion that the "jumping" step (i.e. the continue function associated with the "clear-and-continue" signal) is based on the signal which Kirimoto uses to detect a channel change. Applicants submit that no "clear-and-continue" signal is taught or suggested by Kuboki or Kirimoto.

In addition, Kuboki or Kirimoto are improperly combined. In order to support a § 103 rejection based on a combination of references, the Examiner must provide a sufficient motivation for making the relevant combinations. *See* M.P.E.P. §§ 2142 and 2143.01; *see also In re Rouffet*, 149 F.3d 1350, 1355, 47 USPQ2d 1453, 1456 (Fed. Cir. 1998) ("When a rejection depends on a combination of prior art references, there must be some teaching, suggestion, or motivation to combine the references."). It is well-settled that an Examiner can "satisfy [the burden under 35 U.S.C. § 103 to establish a *prima facie* case of obviousness] only by showing some *objective teaching* in the prior art or that knowledge generally available to one of ordinary skill in the art would lead that individual to combine the relevant teachings of the references." *In re Fine*, 837 F.2d 1071, 1074, 5 USPQ2d 1596, 1598 (Fed. Cir. 1988) (emphasis added); *see also In re Lee*, 277 F.3d 1338, 1344, 61 USPQ2d 1430, 1434 (Fed. Cir 2002) ("'deficiencies of the cited references cannot be remedied by the Board's general conclusions about what is 'basic knowledge' or 'common sense'").

As with rejections based on the modification of a single reference, "[b]road conclusory statements regarding the teaching of multiple references, standing alone, are not 'evidence [of a motivation to combine]'" and thus do not support rejections based on combining references. *In re Dembiczak*, 175 F.3d at 999, 50 USPQ2d at 1617. Without objective evidence of a motivation to combine, the obviousness rejection is the "essence of hindsight" reconstruction, the very "syndrome" that the requirement for such evidence is designed to combat, and without which the obvious rejection is insufficient as a matter of law. *Id.* at 999, 50 USPQ2d at 1617-18.

There is no showing of any objective teaching to combine the references in the Office action. The Office action merely states: "The examiner maintains that it would have been obvious to have modified the system disclosed by Kuboki so as to have detected channel changes in the manner described in Kirimoto in order to avoid the need for special tuning circuitry and/or allow the decoder of Kuboki to be implemented as a stand alone device." This broad, conclusory statement is not sufficient, under the controlling authorities set forth above, to justify combining the teachings of Kuboki and Kirimoto. Indeed, this broad, conclusory statement is nothing more than the Examiner's speculation on what could possibly be achieved if the references could be combined. In fact, a person of ordinary skill in the art would not be motivated to combine the teachings of Kuboki and Kirimoto. Specifically, Kuboki attempts to solve the problem of the occurrence of "unnatural phenomenon" that may appear when a user attempts to change the channel from one teletext-carrying channel (i.e., "channel A") to another teletext carrying channel (i.e., "channel B"). The Examiner asserts that this is done by detection of a signal generated by Kuboki's tuner. In contrast, Kirimoto attempts to deal with the particular situation of the user changing the channel from a teletext-carrying channel to a channel that does not carry teletext. The Examiner asserts that this is done by detecting channel changes by detecting the digital teletext data itself. Rather attempt to combine the teachings of Kuboki and Kirimoto, the Examiner instead attempts to substitute Kirimoto's alleged detection scheme for Kuboki's. This substitution would add nothing to Kuboki, because it appears that Kuboki's system would already handle the particular problem that Kirimoto tries to address.

In other words, these two schemes represent completely different approaches to addressing problems associated with channel changes, and there is simply no reasoning provided as to why one of ordinary skill would be motivated to combine such disparate teachings. For at least the following reasons, applicants respectfully submit that the rejections of claims 2, 6, 7, 8, 24, 28, and 31 based on this combination are improper and therefore should be withdrawn for at least this reason.

Claims 6, 7, 8, 24, 28 and 31 were rejected under 35 U.S.C. § 103(a) "for the same reasons that were set forth for claim 2 above" (Office action, p. 49). There is no treatment of the specific limitations contained in these claims. This is improper. The M.P.E.P. clearly requires the Examiner to show that all of the limitations of a claim are taught or suggested by the prior art in order to establish a prima facie case of obviousness for that claim. See M.P.E.P. § 2143.03. This was not done for any of claims 6, 7, 8, 24, 28 and 31. Accordingly, for at least this reason and those provided above, applicants respectfully submit that these rejections are improper and should therefore be withdrawn.